



## Department of Energy

ROCKY FLATS OFFICE P.O. BOX 928 GOLDEN, COLORADO 80402-0928

DEC 21 1990

90-DOE-11186

Frederick R. Dowsett, PhD, Unit Leader Monitoring and Enforcement Hazardous Materials and Waste Management Division Colorado Department of Health 4210 East 11th Avenue Denver, Colorado 80601

Dear Dr. Dowsett:

The Agreement in Principle between the U.S. Department of Energy and the State of Colorado dated June 28, 1989, requires cleanup of the Solar Evaporation Ponds at the Rocky Flats Plant by October, 1991. However, the current evaporation rate of water in these ponds will not support the cleanup of the ponds by that date.

In order to expedite the cleanup of the solar ponds, various techniques are being proposed to enhance evaporation of the water in the solar ponds. One technique is the use of portable evaporators to help remove water from the 207A and 207B Solar Evaporation Ponds. From each of these ponds, water will be pumped to three portable evaporators located within a building near the solar ponds. The concentrate from the evaporators will be cemented in the pondcrete and/or saltcrete processes. Distillate from the evaporators will be discharged into one of the three 7,000 gallon batch tanks for sampling. Distillate meeting sampling parameters will be reused as makeup water in the raw water or condensate systems. A 500,000 gallon tank will serve as a distillate surge tank in case the raw water or condensate systems temporarily have no demand for the distillate. A more detailed description of the portable evaporation system is provided in Enclosure A.

Based on the sampling plan outlined in Enclosure A, acceptable distillate from the 7,000 gallon batch tanks will be considered an effective substitute for the commercially available water that is used in the raw water and condensate systems. Thus, the distillate will be excluded from the definition of a solid waste under the Colorado Hazardous Waste Regulations (6 CCR 1007-3, Section 261.2[e][ii]). Therefore, no secondary containment is planned for the 500,000 gallon distillate surge tank.

The portable evaporators are also needed to handle water that is currently discharged into the 207B Pond from the french drain system located north of the ponds. In order to prevent additional accumulation of water in the 207B Pond, french drain surge tanks will be built in the vicinity of the ponds to hold the french drain water before it is sent to the portable evaporators. A more detailed description of the french drain surge tanks is provided in Enclosure B. It should be noted that the 207B Pond is divided into three separate ponds (207B North, South and Center). In order to effectively handle the pond water and sludge, transfers between the 207B North, South and Center ponds will continue to be done as in the past.

In a telephone conversation with Mr. Jim Kiefer on December 7, 1990, and again during discussions at a December 12, 1990 meeting with Rocky Flats personnel, you indicated that use of the portable evaporation system would not require submittal of a revised Part A Permit Application. You further stated that use of the portable evaporation system would require a letter to Colorado Department of Health (CDH) requesting a change to interim status. Therefore, this letter requests that CDH approve the change to interim status for use of the portable evaporation system and french drain surge tanks as described in the enclosures to this letter.

If you have any questions, please call me or have your staff call Tom Lukow of my staff at 966-4561.

Sincerely,

Robert M. Nelson, Jr.

Manager

## Enclosures:

cc w/o Enclosures:

J. M. Kersh, EG&G/RFP

T. E. Lukow, DOE/RFO

A. L. Schubert, EG&G/RFP

J. Kiefer, DOE/RFO

F. Lockhart, DOE/RFO